

## EAST Search History

| Ref # | Hits | Search Query                                    | DBs  | Default Operator | Plurals | Time Stamp       |
|-------|------|---|--|------------------|---------|------------------|
| L1    | 311  | (microphone near2 flat)                         | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR               | ON      | 2006/10/30 10:09 |
| L2    | 949  | PCB and (battery and microphone) and connect\$4 | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR               | ON      | 2006/10/30 10:09 |
| L3    | 2811 | 455/550.1                                       | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR               | ON      | 2006/10/30 10:09 |
| L4    | 1283 | 455/572   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR               | ON      | 2006/10/30 10:09 |
| L5    | 2352 | 455/575.1                                       | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR               | ON      | 2006/10/30 10:09 |
| L6    | 715  | 361/814   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR               | ON      | 2006/10/30 10:09 |
| L7    | 6845 | L2 or L3 or L4 or L5 or L6                      | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR               | ON      | 2006/10/30 10:09 |
| L8    | 3    | (microphone near2 flat) and L7                  | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR               | ON      | 2006/10/30 10:09 |

## EAST Search History

|    |      |   |  |    |    |                  |
|----|------|---|--|----|----|------------------|
| S1 | 839  | PCB and (battery and microphone) and connect\$4 | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 19:23 |
| S2 | 2320 | 455/550.1                                       | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 19:24 |
| S3 | 1184 | 455/572   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 19:24 |
| S4 | 1873 | 455/575.1                                       | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 14:29 |
| S5 | 685  | 361/814   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 19:24 |
| S6 | 5882 | S1 or S2 or S3 or S4 or S5                      | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 21:52 |
| S7 | 839  | S1 and S6                                       | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 19:56 |
| S8 | 78   | (engagement adj sink)                           | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 19:29 |

## EAST Search History

|     |        |  |  |    |    |                  |
|-----|--------|--|--|----|----|------------------|
| S9  | 158    | (engag\$4 adj sink)                          | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/23 20:10 |
| S10 | 0      | S7 and S9                                    | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 19:31 |
| S11 | 2      | S6 and S9                                    | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 19:31 |
| S12 | 797012 | conduct\$4 and insulat\$4                    | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 19:56 |
| S13 | 195    | S7 and S12                                   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 20:13 |
| S14 | 3661   | battery and microphone and<br>(insulat\$4)   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 20:49 |
| S15 | 603    | battery same microphone same<br>(insulat\$4) | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 20:25 |
| S16 | 7      | S6 and S15                                   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 20:15 |

## EAST Search History

|     |       |  |  |    |    |                  |
|-----|-------|--|--|----|----|------------------|
| S17 | 5109  | S2 or S3 or S4 or S5   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 20:24 |
| S18 | 1080  | battery same microphone same<br>(opposite)                         | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 20:25 |
| S19 | 280   | battery same microphone same<br>(opposite adj side)                | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 20:25 |
| S20 | 4     | S19 and S17  | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 20:26 |
| S21 | 4059  | battery and microphone and<br>(insulat\$4 or (non adj conductive)) | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 20:50 |
| S22 | 319   | S21 and S6   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 20:51 |
| S23 | 22068 | (microphone near4 (connect\$4 or<br>wir\$4))                       | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 20:52 |
| S24 | 119   | S22 and S23  | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/10 20:52 |

## EAST Search History

|     |        |   |   |    |    |                  |
|-----|--------|---|---|----|----|------------------|
| S25 | 0      | (coin adj battery) and ((nonconduct\$4 or insulat\$4) adj (cover or board)) | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/10 21:54 |
| S26 | 171    | (coin adj battery) and (substrate or cover or board)                        | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/10 21:54 |
| S27 | 4      | S6 and S26  | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/10 21:55 |
| S28 | 317329 | (wireless or portable cell\$4 or mobile) adj (phone or telephone or handy)  | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/10 21:57 |
| S29 | 2      | S28 and ((coin adj battery) near4 board)                                    | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/10 21:57 |
| S30 | 63     | S28 and (coin adj battery)  | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/10 22:00 |
| S31 | 1      | S28 and ((coin adj battery) near4 pcb)                                      | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/10 22:01 |
| S32 | 158    | (engag\$4 adj sink)   | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/23 20:11 |

## EAST Search History

|     |         |   |  |    |    |                  |
|-----|---------|---|--|----|----|------------------|
| S33 | -197607 | (nonconduct\$4 or insulat\$4) near3<br>(body or cover or piece or support)  | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/23 20:14 |
| S34 | 65506   | (nonconduct\$4 or insulat\$4) adj<br>(body or cover or piece or support)  | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/23 20:16 |
| S35 | 6920    | ((nonconduct\$4 or insulat\$4) adj<br>(body or cover or piece or support))<br>near10 (cavity or hole or space or<br>holder or socket)   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/23 20:18 |
| S36 | 0       | ((nonconduct\$4 or insulat\$4) adj<br>(body or cover or piece or support))<br>near10 (cavity or hole or space or<br>holder or socket) near10 ((battery)<br>and (mic or microphone)) | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/23 20:19 |
| S37 | 47      | ((nonconduct\$4 or insulat\$4) adj<br>(body or cover or piece or support))<br>near10 (cavity or hole or space or<br>holder or socket) near10 ((battery)<br>or (mic or microphone))  | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 14:05 |
| S38 | 359071  | (mobile or wireless or portable or<br>cell\$4) adj (phone or telephone or<br>terminal)  | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 14:03 |
| S39 | 320251  | (mobile or wireless or portable or<br>cell\$4) adj (phone or telephone)   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 14:03 |
| S40 | 47      | ((nonconduct\$4 or insulat\$4) adj<br>(body or cover or piece or support))<br>near10 (cavity or hole or space or<br>holder or socket) near10 ((battery)<br>or (mic or microphone))  | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 14:04 |

## EAST Search History

|     |      |   |  |    |    |                  |
|-----|------|---|--|----|----|------------------|
| S41 | 3    | S40 and S38   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 14:04 |
| S42 | 6920 | ((nonconduct\$4 or insulat\$4) adj<br>(body or cover or piece or support))<br>near10 (cavity or hole or space or<br>holder or socket) | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 14:05 |
| S43 | 103  | S42 and S38   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 14:06 |
| S44 | 1907 | 455/575.1   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 14:31 |
| S45 | 388  | S44 and ((connector or body or<br>housing or cover or board) near4<br>(battery or microphone))  | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 15:16 |
| S46 | 44   | S44 and ((connector or body or<br>housing or cover or board) near4<br>(battery and microphone))                                       | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 14:50 |
| S47 | 1    | S44 and ((connector or body or<br>housing or cover or board) adj4<br>compris\$4 adj (battery or<br>microphone))                       | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 14:50 |
| S48 | 44   | S44 and ((connector or body or<br>housing or cover or board) near4<br>(battery and microphone))                                       | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 15:18 |

## EAST Search History

|     |        |  |   |    |    |                  |
|-----|--------|--|---|----|----|------------------|
| S49 | 790    | (mobile or portable or wireless or cell\$4 adj (phone or telephone)) and ((connector or body or housing or cover or board) near4 (battery and microphone)) | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/24 16:34 |
| S50 | 101403 | "455"/\$   | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/24 15:17 |
| S51 | 336    | S50 and ((connector or body or housing or cover or board) near4 (battery and microphone))  | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/24 16:42 |
| S52 | 2      | S50 and ((connector or body or housing or cover or board) near4 (battery same microphone same (opposite adj side)))  | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/24 16:10 |
| S53 | 0      | 2004/0204185   | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/24 16:10 |
| S54 | 2      | "20040204185"  | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/24 16:28 |
| S55 | 891    | (reduc\$4 or decreas\$4 or sav\$4 or increas\$4) near4 (space or area) near4 (circuit adj board or (PCB))  | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/24 16:29 |
| S56 | 277    | ((reduc\$4 or decreas\$4 or sav\$4 or increas\$4) near4 (space or area) near4 (circuit adj board or (PCB))). ab,ti.  | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/24 17:01 |

## EAST Search History

|     |         |   |  |    |    |                  |
|-----|---------|---|--|----|----|------------------|
| S57 | 1236541 | (mobile or portable or wireless or cell\$4 adj (phone or telephone))                      | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 16:34 |
| S58 | 34      | S56 and S57   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 16:35 |
| S59 | 0       | S51 and S55   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 16:41 |
| S60 | 0       | S55 and ((connector or body or housing or cover or board) near4 (battery and microphone)) | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 16:42 |
| S61 | 1       | S56 and S50   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 17:02 |
| S62 | 25      | S57 and (PCB or (circuit adj board)) and (coin adj battery)                               | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 17:21 |
| S63 | 8       | S57 and (PCB or (circuit adj board)) and (coin adj battery) and housing                   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 17:03 |
| S64 | 618     | S57 and (PCB or (circuit adj board)) and (connector near2 (nonconductive or insulat\$4))  | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 17:22 |

## EAST Search History

|     |         |  |   |    |    |                  |
|-----|---------|--|---|----|----|------------------|
| S65 | 10      | S57 and (PCB or (circuit adj board)) and (connector near2 (nonconductive or insulat\$4) near4 (battery or microphone)) | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/24 17:59 |
| S66 | 261     | (hollow\$2 or cavit\$4) near3 (side adj wall) near5 (terminal)   | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/24 18:01 |
| S67 | 0       | S44 and S66  | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/24 18:01 |
| S68 | 0       | S50 and S66  | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/24 18:01 |
| S69 | 1844099 | S66 (housing)  | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/24 18:02 |
| S70 | 166     | S66 and (housing)  | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/24 18:02 |
| S71 | 5       | S66 and (housing) and S57  | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/24 18:18 |
| S72 | 6673    | (hollow near\$4 cavit\$4 ) and (housing) and S57 and (battery near2 connect\$4)  | US-PGPUB; USPAT; USOCR; EPO; DERWENT; IBM_TDB | OR | ON | 2006/06/24 18:25 |

## EAST Search History

|     |       |  |  |    |    |                  |
|-----|-------|--|--|----|----|------------------|
| S73 | 26201 | (battery near2 connect\$4).ab,ti.  | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 18:20 |
| S74 | 412   | S72 and S73  | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 18:20 |
| S75 | 6183  | (hollow near\$4 cavit\$4 near4 battery) and (housing) and S57 and (battery near2 connect\$4) | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 18:25 |
| S76 | 364   | S75 and S74  | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 19:19 |
| S77 | 90    | (hollow or trench or cavity) near5 (four adj3 terminal)                                      | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 19:20 |
| S78 | 57    | S77 and S69  | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 19:24 |
| S79 | 0     | S77 and S69 and (mobile and phone)   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 19:24 |
| S80 | 0     | S77 and S69 and (mobile adj phone)   | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 19:25 |

## EAST Search History

|     |   |  |  |    |    |                  |
|-----|---|--|--|----|----|------------------|
| S81 | 1 | S77 and S69 and ((mobile or wireless or portable or cellular) adj phone) | US-PGPUB;<br>USPAT;<br>USOCR;<br>EPO;<br>DERWENT;<br>IBM_TDB | OR | ON | 2006/06/24 19:25 |
|-----|---|--|--|----|----|------------------|